

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

1. (Canceled)
2. (Previously Presented) The device of claim 4, wherein the transparent conductive material includes indium tin oxide (ITO).
3. (Previously Presented) The device of claim 4, wherein the transparent conductive material includes indium zinc oxide (IZO).
4. (Currently Amended) An in-plane switching liquid crystal display device comprising:
 - a gate line formed of a first material on a first substrate;
 - a data line on the first substrate, the data line being perpendicular to the gate line;
 - a common line on the first substrate, the common line being parallel with the gate line and being formed of a metal;
 - a plurality of pixel electrodes and a plurality of common electrodes having finger portions and arranged in parallel on the first substrate, the common electrodes being a transparent conductive second material different from the first material, and the pixel electrodes being one of a transparent and opaque material;
 - a first connecting line parallel to the gate line, wherein the plurality of pixel electrodes are perpendicular to the first connecting line, first ends of the pixel electrodes are connected to the first connecting line and second ends of the pixel electrodes are connected to a second connecting line;
 - an auxiliary common line connected with the plurality of common electrodes, the auxiliary common line covering the common line such that the auxiliary common line contacts side and top surfaces of the common line;
 - a storage electrode over the common line, wherein the storage electrode contacts the second connecting line via a storage contact hole; and

a liquid crystal layer between the first and second substrates, wherein the common electrodes alternate with and are parallel to the pixel electrodes,

wherein the common electrodes are formed on a same layer of the first substrate as the gate line[[,]]

~~wherein the common electrodes are arranged to directly contact the common line, and
wherein the common line wraps first ends of the finger portions of the common electrodes such that the common line contacts side and top surfaces of the first ends of the finger portions of the common electrodes, and second ends of the finger portions of the common electrodes are connected to each other.~~

5-6. (Canceled)

7. (Previously Presented) The device of claim 4, wherein the common line includes a material selected from a group consisting of chromium (Cr), aluminum (Al), aluminum alloy (Al alloy), molybdenum (Mo), Tantalum (Ta), tungsten (W), antimony (Sb), and an alloy thereof.

8. (Previously Presented) The device of claim 4, further comprising a first alignment layer on the first substrate.

9. (Previously Presented) The device of claim 8, wherein the first alignment layer is selected from a group consisting of polyimide and photo-alignment material

10. (Previously Presented) The device of claim 4, further comprising a thin film transistor at an intersection of the gate and data lines.

11. (Withdrawn) The device of claim 5, wherein at least one of the pixel and common electrodes is on the same layer with the gate electrode.

12. (Previously Presented) The device of claim 4, further comprising a gate-insulating layer over the gate line.

13. (Original) The device of claim 12, further comprising a passivation layer over the gate-insulating layer.

14. (Previously Presented) The device of claim 13, wherein the pixel electrodes are on the passivation layer.

15. (Original) The device of claim 13, further comprising a black matrix on the passivation layer.

16. (Original) The device of claim 15, wherein the black matrix includes the same material as the pixel electrodes.

17. (Currently Amended) An in-plane switching Liquid Crystal Display (LCD) device, comprising:

a first substrate and a second substrate;

a gate line formed of a first material on the first substrate;

a metal common line on the first substrate, the common line parallel to the gate line.

a data line on the first substrate, the data line being perpendicular to the gate line;

a plurality of common electrodes on the first substrate, the plurality of common electrodes having finger portions;

an auxiliary common line connected with the plurality of common electrodes, the auxiliary common line covering the common line such that the auxiliary common line contacts side and top surfaces of the common line;

a thin film transistor having a gate electrode, a source electrode and a drain electrode formed on the first substrate;

a liquid crystal layer interposed between the first and second substrates;

a plurality of pixel electrodes contacting the drain electrode of the thin film transistor;

a first connecting line contacting the drain electrode and parallel to the gate line, wherein the plurality of pixel electrodes are perpendicular to the first connecting line, first ends of the pixel electrodes are connected to the first connecting line and second ends of the pixel electrodes are connected to a second connecting line; and

a storage electrode over the common line, wherein the storage electrode contacts the second connecting line,

wherein the common electrodes alternate with and are parallel to the pixel electrodes, and wherein the common electrodes are a transparent conductive second material different from the first material, the pixel electrodes are one of a transparent and opaque material, and the common electrodes are formed on a same layer of the first substrate as the gate line,

~~wherein the common electrodes are arranged to directly contact the common line, and wherein the common line wraps first ends of the finger portions of the common electrodes such that the common line contacts side and top surfaces of the first ends of the finger portions of the common electrodes, and second ends of the finger portions of the common electrodes are connected to each other.~~

18. (Original) The LCD device of claim 17, wherein a portion of the common line overlies a portion of the common electrode.

19. (Withdrawn) The LCD device of claim 17, wherein a portion of the common electrode overlies a portion of the common line.

20. (Canceled)

21. (Previously Presented) The LCD device of claim 17, wherein the storage electrode contacts the pixel electrodes through a storage contact hole.

22. (Previously Presented) The LCD device of claim 17, wherein the storage electrode is between the pixel electrodes and the first substrate.

23-26. (Canceled)

27. (Previously Presented) The LCD device of claim 17, further comprising a common pad at an end of the common line.

28. (Original) The LCD device of claim 17, further comprising an auxiliary gate line and a gate pad covering the gate line and the gate pad.

29. (Previously Presented) The LCD device of claim 28, wherein the auxiliary gate line is formed of the same transparent conductive material as the common electrodes.

30. (Original) The device of claim 28, wherein the auxiliary gate line includes indium tin oxide (ITO).

31. (Original) The device of claim 28, wherein the auxiliary gate line includes indium zinc oxide (IZO).

32. (Original) The LCD device of claim 17, further comprising a black matrix on the second substrate.

33. (Original) The LCD device of claim 17, wherein the transparent conductive material includes indium tin oxide (ITO).

34. (Original) The LCD device of claim 17, wherein the transparent conductive material includes indium zinc oxide (IZO).

35. (Withdrawn) An in-plane switching Liquid Crystal Display (LCD) device, comprising:

- a first substrate and a second substrate;
- a gate line formed of a first material on the first substrate;
- a metal common line on the first substrate, the common line parallel to the gate line.
- a data line on the first substrate, the data line being perpendicular to the gate line;
- a plurality of common electrodes of a transparent conductive second material different from the first material on the first substrate;
- a thin film transistor having a gate electrode, an active layer, a source electrode and a drain electrode formed on the first substrate;
- a black matrix covering the active layer;

a liquid crystal layer interposed between the first and second substrates; and
a plurality of pixel electrodes of an opaque metal contacting the drain electrode of the thin film transistor, wherein the common electrodes alternate with and are parallel to the pixel electrodes, and
wherein the common electrodes are on a same layer of the first substrate as the gate line.

36. (Withdrawn) The LCD device of claim 35, further comprising a black matrix formed of the same opaque metal as the pixel electrode.

37. (Withdrawn) The LCD device of claim 36, wherein the opaque metal is Cr.

38. (Withdrawn) The LCD device of claim 35, wherein the opaque metal is Cr.

39. (Withdrawn) A method of fabricating an in-plane switching liquid crystal display device, comprising:

- forming a gate line on a substrate;
- forming a common line spaced apart and parallel to the gate line;
- forming a data line spaced apart and perpendicular to the gate and common lines;
- forming gate and source electrodes near an intersection of the gate and data lines on an active layer, wherein the gate and source electrodes are electrically connected to the gate and data lines, respectively;
- forming a plurality of common electrodes on the substrate in contact with the common line;
- forming a drain electrode having a drain contact hole, wherein the drain electrode is spaced apart from the source electrode and overlaps a portion of the gate electrode;
- forming a gate insulating layer over the gate and common electrodes; and
- forming a plurality of pixel electrodes parallel to the common electrodes, wherein the pixel and common electrodes are formed from a transparent material.

40. (Withdrawn) A method of fabricating an in-plane switching liquid crystal display device, comprising:

- forming a plurality of common electrodes on a substrate;

forming a common line on a substrate to overlap a portion of the common electrodes;
forming a gate line spaced apart and in parallel to the common line;
forming gate and source electrodes near an intersection of the gate and data lines on an active layer, wherein the gate and source electrodes are electrically connected to the gate and data lines, respectively;
forming a data line spaced apart and perpendicular to the gate and common lines;
forming a drain electrode having a drain contact hole, wherein the drain electrode is spaced apart from the source electrode and overlaps a portion of the gate electrode;
forming a gate insulating layer over the gate and common electrodes; and
forming a plurality of pixel electrodes parallel to the common electrodes, wherein the pixel and common electrodes are formed from a transparent material.

41. (Withdrawn) An in-plane switching liquid crystal display device comprising:
a gate line formed of a first material on a first substrate;
a data line on the first substrate, the data line being perpendicular to the gate line;
a common line on the first substrate, the common line being parallel with the gate line and being formed of a metal;
a plurality of pixel electrodes and a plurality of common electrodes having finger portions and arranged in parallel on the first substrate, the common electrodes being a transparent conductive second material different from the first material, and the pixel electrodes being one of a transparent and opaque material;
a first connecting line parallel to the gate line, wherein the plurality of pixel electrodes are perpendicular to the first connecting line, first ends of the pixel electrodes are connected to the first connecting line and second ends of the pixel electrodes are connected to a second connecting line;
a storage electrode over the common line, wherein the storage electrode contacts the second connecting line via a storage contact hole;
a liquid crystal layer between the first and second substrates, wherein the common electrodes alternate with and are parallel to the pixel electrodes; and
an auxiliary common line on the first substrate, the auxiliary common line being connected with the common electrodes, wherein the common electrodes are formed on a same layer of the first substrate as the gate line,

wherein the common electrodes are formed on the common line, and
wherein the common electrodes are arranged to directly contact the common line.

42. (Withdrawn) An in-plane switching Liquid Crystal Display (LCD) device, comprising:

- a first substrate and a second substrate;
- a gate line formed of a first material on the first substrate;
- a metal common line on the first substrate, the common line parallel to the gate line.
- a data line on the first substrate, the data line being perpendicular to the gate line;
- a plurality of common electrodes on the first substrate;
- a thin film transistor having a gate electrode, a source electrode and a drain electrode formed on the first substrate;
- a liquid crystal layer interposed between the first and second substrates;
- a plurality of pixel electrodes contacting the drain electrode of the thin film transistor;
- a first connecting line contacting the drain electrode and parallel to the gate line, wherein the plurality of pixel electrodes are perpendicular to the first connecting line, first ends of the pixel electrodes are connected to the first connecting line and second ends of the pixel electrodes are connected to a second connecting line; and
- a storage electrode over the common line, wherein the storage electrode contacts the second connecting line,
- wherein the common electrodes alternate with and are parallel to the pixel electrodes,
- wherein the common electrodes are a transparent conductive second material different from the first material, the pixel electrodes are one of a transparent and opaque material, and the common electrodes are formed on a same layer of the first substrate as the gate line,
- wherein the common electrodes are formed on the common line, and
- wherein the common electrodes are arranged to directly contact the common line.